UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/814,433	03/31/2004	Robert M. Harman	CS23509RL	5437

20280   7590   09/19/2006

MOTOROLA INC
600 NORTH US HIGHWAY 45
ROOM AS437
LIBERTYVILLE, IL 60048-5343

EXAMINER
CHU, DAVID H

ART UNIT	PAPER NUMBER
2628	

DATE MAILED: 09/19/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

PTO-90C (Rev. 10/03)

	Application No.	Applicant(s)
Office Action Summary	10/814,433	HARMAN, ROBERT M.
	Examiner	**Art Unit**	
	David H. Chu	2628	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *19 July 2006*.

2a)☒ This action is **FINAL**.   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-16* is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-10* is/are rejected.

7)☒ Claim(s) *11-16* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *31 March 2004* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All   b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☒ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☐ Information Disclosure Statement(s) (PTO/SB/08)
    Paper No(s)/Mail Date _____.

4)☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____.

5)☐ Notice of Informal Patent Application

6)☐ Other: _____.

DETAILED ACTION

Response to Amendment

1.   Acknowledgment is made of the amendment filed by the applicant on

07/19/2006, in which:

2.   The applicant traversed all the outstanding objections and rejections.

3.   Claims 1-16 are currently pending in U.S. Application Serial No. 10/814,433 and

an Office Action on the merits follows.

Claim Rejections - 35 USC § 103

4.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

5.   A patent may not be obtained though the invention is not identically disclosed or described as set forth
in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art
are such that the subject matter as a whole would have been obvious at the time the invention was made to a
person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived
by the manner in which the invention was made.

6.   Claim 1 is rejected under 35 U.S.C. 103(a) as being unpatentable over Seni

et al. (PGPUB Document No. US 203/0007018), further in view of Bott et al. ("Using

Microsoft Office 2000").

7.   <u>Note with respect to claim 1</u>,

8.   Seni et al. teaches:

9.   A **reduced keypad** 132 (FIG.2);

10.   It is inherent that a PDA comprise of a **processor**.

11.   Further, it is inherent for a computer system device, such as the handheld device

100 (FIG 1) of reference Seni, to include an **input buffer** for any input device such as a

reduced keypad, as Seni teaches an input buffer for handwritten word using a stylus

pen.

12.   However, Seni et al. does not expressly teach:

13.   A **display buffer**.

14.   It is well known in the art to use a display buffer for a device with a screen to enable simultaneous display of data transmitted to the screen.

15.   Further, Seni et al. teaches that the device runs under operating systems such as, Windows CE from Microsoft Corporation.

16.   Therefore, it would have been obvious to one of an ordinary skill in the art to utilize a display buffer to a PDA device with a screen, because this will allow efficient rendering of simultaneous objects for a handheld device running under any operating system.

17.   Further Seni et al. does not expressly teach the above device:

18.   Entering **character codes** and **intermediate codes**;

19.   **Changing intermediate codes into character code sequences**.

20.   Bott et al. teaches:

21.   In Microsoft Word, creating a new entry to the AutoCorrect list (pg 267, "Entering Text and Graphics Automatically with AutoText and AutoCorrect"). Once a new entry

has been created, the user can assign customizable shortcut keys (pg 56, "Bypassing Menus with Keyboard Shortcuts").

22.   The shortcut key is the equivalent to an **intermediate code**, wherein the input character code corresponding to the shortcut key is stored in the input buffer when the user types the shortcut key combination. Upon completion of entering the shortcut key, the character code corresponding to the shortcut key changes to the AutoText character code.

23.   For example, the user may assign "crtl+m" as the shortcut key for "Mask," wherein "crtl+m" is the **intermediate code** and the corresponding assigned word "Mask" is the **character code sequence**, as recited by applicant.

24.   Therefore, it would have been obvious to one of an ordinary skill in the art to apply the AutoText teachings of Bott et al. to the handheld device of Seni et al., because this will enable the user input characters that do not appear on the reduced keypad/keyboard.

25.   Note with respect to claim 2, 3 and 4,

26.   Seni et al. and Bott et al. does not expressly teach:

27.   The intermediate codes comprise a Ligature intermediate code / Explicit Virama intermediate code and Half-character intermediate code.

28.   It is well known in the art to assign shortcut keys (hotkey) to symbols or characters that are difficult to type.

29.   Therefore, it would have been obvious to one of an ordinary skill in the art to assign a Ligature/Explicit Virama/Half-Character when creating a new entry for the AutoText teachings of Bott et al., because this will allow add customization to the user for creating documents.

30.   Claims 5 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Seni et al., in view of Bott et al. as applied to claims 1-4 above, and further in view of Laukkanen (U.S. Patent No. 6,934,564).

31.   Note with respect to claim 5,

32.   The teachings of Seni et al. and Bott et al. does not expressly teach:

33.   A display engine, coupled to the display buffer, for processing character codes and character code sequences for display.

34.   Laukkanen et al. teaches:

35.   A **Display engine** 130C that is responsible for correctly forming images on the display 140 of the characters that makes up the writing (FIG 1) (col.5, line 55-57).

36.   <u>Note with respect to claim 6,</u>

37.   Laukkanen et al. teaches a **Display screen** 140 (FIG. 1).

38.   <u>Note with respect to claim 7,</u>

39.   Components of Seni et al and Laukkanen et al. have been discussed above with

respect to claims 1, 5 and 6.

40.   Further Bott et al. teaches:

41.   The AutoCorrect function of Microsoft Word that corrects misspelled words (pg

101-108, "Using AutoCorrect to Automate Documents").

42.   A user may type:

43.   "Librar" as the first character;

44.   "i" as the next character.

45.   The AutoCorrect function of Microsoft Word will change the "i" to a "y" because of

the preceding characters "Librar."

46.   This is the equivalent to **changing an intermediate code into one or more**

character codes depending on any preceding character code that precedes the

intermediate code, wherein "i" is the intermediate character code.

47.　　Note further, the typing of a character code "." to activate the AutoCorrect

function has not affect on how the intermediate character code "i" changes. Clearly, the

intermediate code "i" changes depending on the preceding character code "Librar" not

the character code ".".

48.　　<u>Note with respect to claim 8,</u>

49.　　Bott et al. teaches:

50.　　The AutoCorrect function as described above.

51.　　A user may type:

52.　　"Acti" as the first character sequences;

53.　　"n" as the next character.

54.　　The AutoCorrect function of Microsoft Word will change the "e" to a "o" because

of the following character "n.".

55.　　This is the equivalent to **changing the intermediate code "e" into one or more**

character codes "o" depending on any following character code "n." that follows

the intermediate code, as recited by applicant.

56.　　<u>Note with respect to claim 9,</u>

57.　　Refer to claim rejection 1 discussed above.

58.   Note with respect to claim 10, claim 10 is similar in scope to the claims 7 and 8,

thus the rejections to claims 7 and 8 hereinabove are also applicable to claim 10.

59.   "Acti" is the first character code sequence;

60.   "e" is the intermediate code;

61.   "n." is the second character code sequence.

62.   As described above, the intermediate code "e" changes into "o".

63.   Therefore the above is the equivalent to:

64.   Changing **the intermediate code** ["e"] to one or more **character codes** ["o"];

65.   Displaying one or more characters represented by the **first character code

sequence** ["Acti"], the one or more **character codes** ["o"], and the **second character

code sequence** ["n."].

Response to Arguments

66.   Applicant's arguments filed 7/19/2006 have been fully considered but they

are not persuasive.

67.   <u>Note with respect to claims 1-6</u>,

The applicant argues:

a) Input buffer of the Seni reference is used for handwriting recognition and is

not linked to the keypad of Seni.

*[Reference Seni, teaches a **reduced keypad** 132 (FIG 2). It is*

***inherent** for a computer system device, such as the handheld*

*device 100 (FIG 1) of reference Seni, to include an **input***

***buffer** for any input device such as a reduced keypad, as Seni*

teaches an input buffer for handwritten word using a stylus

pen.]

b) The AutoCorrect feature in Word, in accordance with reference Bott, only

changes the **intermediate code** ("tpfp") after a Spacebar, Enter Key or any

punctuation mark is pressed.

[The examiner applied the "customizable shortcut keys" (pg 56,

"Bypassing Menus with Keyboard Shortcuts) with the AutoCorrect

list (pg 256, "Entering Text and Graphics Automatically with

AutoText and AutoCorrect") to create a shortcut key for any

user defined character/word. For example, the user may assign

"crtl+m" as the shortcut key for "Mask," wherein "crtl+m" is

*the **intermediate code** and the corresponding assigned word*

*"Mask" is the **character code sequence**, as recited by applicant]*

68.   <u>Note with respect to claim 7,</u>

The applicant argues:

a) The erroneous ending "i" in "library" is only changed to a "y" after a Spacebar,

   Enter key or any other punctuation mark is pressed.

   [Any punctuation mark such as a period is the equivalent to a

   ***following character code** (or part of a sequence of character*

   *codes). Therefore, "librar" is the **preceding character code**,*

   *"i" is the **intermediate character code** and the "." is the*

   ***following character code**. As a result, the intermediate*

   character code "i" changes to a "y" after typing the following

   character code ".".

   Correcting the word "actien" to "action" is another example,

   *wherein "acti" is the **preceding character code**, "e" is the*

   intermediate character code**, and "n." is the **following

   ***character code**.]*

69.   <u>Note with respect to claim 10,</u>

The applicant argues:

a) According to reference Bott, typing "actien" does not change the "e" to an "o"

as long as Spacebar, Enter key or any punctuation mark is not pressed.

[*Refer to the examiner's response to argument above with*

respect to claim 7. Further, the ". " and "n. " of the

respective examples above are the equivalent to the second

character code, as recited by applicant.]

Conclusion

70. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time

policy as set forth in 37 CFR 1.136(a).

71. A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within

TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

the advisory action. In no event, however, will the statutory period for reply expire later

than SIX MONTHS from the mailing date of this final action.

72. Any inquiry concerning this communication or earlier communications from the

examiner should be directed to David H. Chu whose telephone number is (571) 272-

8079. The examiner can normally be reached on M-TH 9:00am - 7:30pm.

73. If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Mark k. Zimmerman can be reached on (571) 272-7653. The fax phone

number for the organization where this application or proceeding is assigned is 571-

273-8300.

74.   Information regarding the status of an application may be obtained from the

Patent Application Information Retrieval (PAIR) system. Status information for

published applications may be obtained from either Private PAIR or Public PAIR.

Status information for unpublished applications is available through Private PAIR only.

For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a

USPTO Customer Service Representative or access to the automated information

system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

DHC

MARK ZIMMERMAN
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600